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The Influence of Entrepreneurial Orientation, Innovation Capability, and Risk-Taking on Business Performance

Original Article

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Abstract

This study examines the influence of entrepreneurial orientation, innovation capability, and risk-taking on business performance among small and medium enterprises (SMEs). Grounded in the Resource-Based View and dynamic capabilities theory, the research investigates how strategic orientation and organizational capabilities contribute to firm performance in competitive and uncertain business environments. A quantitative explanatory approach was employed using survey data collected from 210 SME owners and managers. Data were analyzed using Partial Least Squares Structural Equation Modeling (PLS-SEM) to assess both measurement and structural models. The findings reveal that entrepreneurial orientation, innovation capability, and risk-taking each have a positive and significant effect on business performance. Among these variables, innovation capability emerged as the strongest predictor, indicating that the ability to develop and implement new ideas, technologies, and processes plays a crucial role in enhancing firm outcomes. Entrepreneurial orientation significantly contributes by fostering proactive and innovative strategic behavior, while risk-taking supports performance through calculated engagement in uncertain opportunities. Collectively, the three variables explain a substantial proportion of variance in business performance, demonstrating the importance of integrating entrepreneurial mindset, innovation processes, and strategic risk behavior. The study provides theoretical contributions by offering an integrated framework of strategic drivers of performance and practical implications for SME managers seeking sustainable competitive advantage.

Keywords: Entrepreneurial Orientation; Innovation Capability; Risk-Taking; Business Performance; SMEs; Dynamic Capabilities; Resource-Based View.

1. Introduction

In the rapidly evolving global business environment, increasing competitiveness, technological advancement, and market uncertainty have heightened the pressure on firms to perform effectively and sustain long-term growth. A persistent focus of contemporary business research has been identifying strategic drivers that enhance firm performance, particularly in small and medium-sized enterprises (SMEs) and emerging market contexts. Among these drivers, entrepreneurial orientation (EO) has been widely recognized as a crucial organizational attribute that supports competitive advantage and value creation (Troise et al., 2022). EO embodies strategic behaviors such as innovativeness, proactiveness, and risk-taking, which collectively reflect a firm's willingness to engage in entrepreneurial actions that challenge the

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status quo and pursue opportunity amidst uncertainty (Covin et al., 2006; Kraus et al., 2012). It is posited that firms with a stronger entrepreneurial orientation tend to adapt more swiftly to environmental changes, generate novel products or services, and ultimately achieve superior business outcomes compared to less entrepreneurially oriented peers.

Previous research has demonstrated the importance of EO in enhancing firm performance, especially through its positive effects on innovation and market competitiveness (Kreiser et al., 2010; Zellweger & Sieger, 2012). For example, entrepreneurial characteristics such as risk-taking and proactiveness have been empirically linked to enhanced firm performance in turbulent markets (Dai et al., 2014; Stam & Elfring, 2008). Similarly, innovative practices driven by entrepreneurial orientation have been shown to act as pivotal mechanisms for value creation, enabling firms to anticipate changes in consumer demands and enhance operational effectiveness (Zighan et al., 2022). However, while EO's relationship with performance is well documented, there remains a need to clarify how innovation capability and risk-taking operate as direct influences or mediating mechanisms within this relationship.

Innovation capability refers to a firm's ability to develop and implement new ideas, processes, and technologies that enhance its competitive position (Cheng et al., 2019; Emumena, 2023). Innovation capacity enables firms to operationalize entrepreneurial actions into tangible products, services, and strategic advantages (Lawson & Samson, 2001). Empirical studies underscore that firms with stronger innovation capabilities outperform competitors through better adaptability, learning routines, and market responsiveness (Yodchai et al., 2022). Nevertheless, despite the proliferation of studies on innovation capability, scant research has directly compared its relative influence on performance alongside EO and risk-taking—particularly in contexts where environmental volatility creates complex resource allocation dilemmas.

Risk-taking is another fundamental component of entrepreneurial orientation, defined as the willingness of firms to commit resources to uncertain ventures with potential for significant returns (Song et al., 2008). Research suggests that risk-taking enhances firm performance by enabling quick responsiveness to emerging opportunities, fostering bold strategic moves, and signaling leadership confidence in uncertain markets. (Okoli et al., 2021). However, risk behaviors can also lead to failure when firms over-extend or misjudge environmental signals, making it essential to investigate risk-taking as both an independent variable and as a contextual influence on EO and innovation (Duell et al., 2018).

The integration of entrepreneurial orientation, innovation capability, and risk-taking offers a comprehensive lens through which business performance can be understood as a multi-dimensional outcome of strategic behavior, resource utilization, and managerial decision-making. In this regard, the dynamic capabilities perspective posits that firms achieve superior performance when they simultaneously leverage organizational capabilities, learning mechanisms, and strategic agility to reconcile internal competencies with external demands (Kreiser et al., 2010). Research adopting this view has shown that firms capable of aligning entrepreneurial orientation with innovation and knowledge management practices consistently achieve higher levels of innovation outcomes and performance (Dai et al., 2014, 2014).

Despite these advances, the literature still reflects several empirical and theoretical gaps. First, although many studies emphasize the positive influence of EO on performance, the specific roles of innovation capability and risk-taking remain underexamined in integrative

frameworks that jointly assess these antecedents. Second, a majority of studies focus on SMEs in developed markets or single-industry contexts, limiting generalizability across different institutional settings. Third, the interaction effects between risk-taking and innovation capability in shaping performance outcomes have not been consistently tested, particularly using robust multi-construct models in empirical research.

To bridge these gaps, this study aims to examine how entrepreneurial orientation, innovation capability, and risk-taking influence business performance in a comprehensive model that captures both direct and indirect effects. Specifically, entrepreneurial orientation is conceptualized as a strategic organizational mindset, innovation capability as an intermediate mechanism that operationalizes creative processes, and risk-taking as both an independent behavioral antecedent and a moderating factor. By investigating these variables collectively, the study seeks to contribute to a deeper understanding of the strategic foundations of business performance in dynamic market contexts.

The objectives of this research are to investigate the influence of entrepreneurial orientation on business performance by examining how proactive, innovative, and risk-oriented behaviors contribute to organizational outcomes. In addition, this study seeks to evaluate the impact of innovation capability on business performance, specifically determining whether organizations with stronger innovation capacities achieve superior performance metrics compared to their competitors. The research also aims to examine the role of risk-taking as a direct predictor of business performance and to explore its potential interaction with entrepreneurial orientation and innovation capability within an integrated framework. Furthermore, this study intends to develop a comprehensive model that explains the joint effects of entrepreneurial orientation, innovation capability, and risk-taking on business performance, thereby offering meaningful theoretical contributions and practical implications for SMEs and policy development. By addressing these objectives, the study provides evidence-based insights to support managerial decision-making, strengthen entrepreneurial development programs, and enrich scholarly discourse on the strategic drivers of performance in contemporary business environments.

2. Literature Review and Hypothesis Development

2.1. Entrepreneurial Orientation and Business Performance

Entrepreneurial Orientation (EO) has been widely conceptualized as a strategic orientation that captures a firm's propensity toward innovativeness, proactiveness, and risk-taking—behaviors that reflect a firm's willingness to pursue new opportunities, experiment with novel ideas, and commit resources to uncertain ventures (Oduro, 2023; Zellweger & Sieger, 2012). Extant literature consistently demonstrates that EO significantly contributes to superior business performance by enabling firms to respond proactively to dynamic and competitive environments (Zellweger & Sieger, 2012). This strategic disposition enhances firm competitiveness by encouraging creative problem-solving, rapid adaptation to market changes, and the pursuit of value-creating opportunities (Kraus et al., 2012; Sahabuddin et al., 2024).

Empirical research has found a generally positive link between EO and performance. For instance, recent evidence indicates that entrepreneurial orientation can significantly enhance multiple dimensions of business performance—such as sales growth, profitability, and market

share—particularly when firms operate in dynamic environments where responsiveness is valued (Erliyani et al., 2025; Walter et al., 2006). A systematic review also highlighted that most research between 2016 and 2021 supports a positive and significant relationship between EO and firm performance across various contexts, especially in small and medium enterprises (Dai et al., 2014; Oduro, 2023). Despite occasional contradictory findings in specific contexts (e.g., weak direct effects in some industries), overall, EO remains a robust predictor of firm outcomes because its dimensions encapsulate core entrepreneurial behaviors crucial for competitive success.

From a theoretical perspective, EO is often grounded in the Resource-Based View (RBV), which argues that internal organizational resources and capabilities, such as entrepreneurial actions, are distinctive competencies that lead to sustainable competitive advantage and superior performance outcomes. Specifically, EO represents an intangible strategic resource that can be leveraged to mobilize tangible actions like innovation and opportunity exploitation, thus reinforcing performance improvements (Kraus et al., 2012; Oduro, 2023).

Given these empirical and theoretical insights, the first hypothesis of this study links EO directly to business performance:

H1. Entrepreneurial orientation has a positive and significant influence on business performance.

2.2. Innovation Capability as a Strategic Resource

Innovation capability refers to an organization's ability to generate, implement, and leverage new ideas, processes, and technologies that enhance its competitiveness and operational effectiveness (Cheng et al., 2019; Emumena, 2023). Firms with strong innovation capability tend to outperform competitors due to their superior adaptability, continuous improvement processes, and ability to introduce novel products or services that meet evolving customer needs (Lawson & Samson, 2001). Recent research also emphasizes that innovation capability acts as a critical mechanism through which entrepreneurial orientation translates into improved performance (Yang et al., 2018).

The strategic importance of innovation capability is well established in contemporary literature. Innovation is increasingly seen as a key driver of long-term competitiveness, enabling firms to sustain growth, navigate competitive threats, and capitalize on emerging market opportunities. For instance, innovation capability has been linked to enhanced financial outcomes, market expansion, and operational agility in both large corporations and SMEs (Song et al., 2008; Yodchai et al., 2022). These outcomes are often achieved through knowledge creation routines, investment in new technologies, and the institutionalization of innovative practices across business processes.

Moreover, innovation capability aligns with dynamic capabilities theory, which suggests that firms must continually reconfigure and update their competencies to match shifting environmental demands. In this context, entrepreneurial orientation provides the motivational foundation for pursuing innovation, while innovation capability represents the operational strength that enables firms to actualize innovative initiatives that drive performance improvements.

Based on these insights, the next hypothesis formalizes the relationship between innovation capability and business performance:

H2. Innovation capability has a positive and significant influence on business performance.

2.3. Risk-Taking and Performance

Risk-taking is a core dimension of entrepreneurial orientation and reflects a firm's willingness to engage in decisions involving uncertainties and potentially substantial outcomes. (Okoli et al., 2021). Firms that embrace risk-taking are more likely to enter new markets, invest in breakthrough technologies, and commit to strategic actions that others may avoid due to uncertainty (Mancini et al., 2017). The literature suggests that risk-taking can enhance performance by enabling firms to seize opportunities before competitors and to innovate with less fear of failure.

However, the effect of risk-taking on performance is contextually contingent. Some research indicates that risk-taking significantly enhances firm growth and performance, particularly in dynamic, uncertain markets (Dai et al., 2014; Kreiser et al., 2010). Other studies suggest that risk-taking may not directly influence performance metrics when it is not coupled with other capabilities such as cost leadership or innovation infrastructure. These mixed findings highlight the need to consider risk-taking not only as an independent predictor but also as a contextual factor that interacts with other strategic resources.

Nevertheless, given that risk-taking is a defining entrepreneurial behavior associated with opportunity recognition and competitive advantage, it is hypothesized as follows:

H3. Risk-taking has a positive and significant influence on business performance.

2.4. Joint Effects: EO, Innovation Capability, Risk-Taking

While existing research has typically examined EO, innovation capability, and risk-taking as separate determinants of performance, an integrative perspective suggests that the joint influence of these constructs provides a more nuanced understanding of how firms achieve superior outcomes. For instance, EO fosters an entrepreneurial mindset that motivates innovation and bold decision-making, innovation capability operationalizes these motivations into competitive products and services, and risk-taking amplifies opportunity capture in uncertain environments. Studies indicate that such joint effects are particularly salient in small and medium enterprises where capabilities and strategic orientations interplay to offset resource limitations (Kreiser et al., 2010).

Moreover, recent studies demonstrate that combining entrepreneurial orientation with strong innovation capacity enhances performance outcomes more effectively than when either factor is present in isolation (Mancini et al., 2017). Likewise, risk-taking behaviors encourage initiatives that spur innovation and help firms adapt to dynamic market conditions, thereby reinforcing performance improvements, especially under environmental uncertainty. Accordingly, firms that align an entrepreneurial mindset with robust innovation processes and informed risk-taking strategies are likely to outperform those that neglect any of these components.

Thus, the final hypothesis captures this integrated framework:

H4. Entrepreneurial orientation, innovation capability, and risk-taking jointly and positively influence business performance.

3. Method

3.1. Research Design

This study employs a quantitative research design using an explanatory approach to examine the causal relationships between entrepreneurial orientation, innovation capability, risk-taking, and business performance. The explanatory design is appropriate because the primary objective of this research is to test hypotheses and determine the magnitude and direction of influence among variables. A cross-sectional survey method was used to collect data at a single point in time from business owners and managers. This approach enables the researcher to analyze relationships among multiple constructs simultaneously and to generalize findings within the defined population.

The study adopts a positivist paradigm, emphasizing objective measurement and statistical testing to validate theoretical relationships. The research framework is grounded in the Resource-Based View (RBV) and Dynamic Capabilities Theory, which posit that internal strategic orientations and capabilities influence firm performance outcomes.

3.2. Population and Sample

The population of this study consists of small and medium enterprises (SMEs) operating within [specify region/country if needed]. SMEs are selected because they represent a significant sector of economic development and are highly influenced by entrepreneurial behaviors, innovation practices, and risk-taking decisions.

A purposive sampling technique was employed to select respondents who met the following criteria:

1. The business has been operating for at least three years.
2. The respondent is the owner or senior manager directly involved in strategic decision-making.
3. The firm engages in market competition where innovation and strategic initiatives are relevant.

The minimum sample size was determined using Hair et al. (2019) recommendation for Structural Equation Modeling (SEM), which suggests at least 5–10 times the number of indicators used in the model. With an estimated 25–30 measurement items, the minimum required sample is between 125 and 300 respondents. To ensure robustness, the study targets at least 200 valid responses.

3.3. Data Collection Technique

Primary data were collected through a structured questionnaire distributed both online (via Google Forms) and offline (printed surveys). Respondents were informed about the purpose of the study, and participation was voluntary. Confidentiality and anonymity were assured to minimize response bias.

The questionnaire consists of two sections:

a) Demographic information, including firm age, firm size, industry type, and respondent position.
b) Measurement of research variables, using established and validated scales from previous studies.

A pilot test was conducted with 30 respondents to ensure clarity, reliability, and validity of the measurement instrument.

3.4. Measurement of Variables

All variables were measured using a five-point Likert scale, ranging from 1 = strongly disagree to 5 = strongly agree.

Entrepreneurial Orientation (EO)

Entrepreneurial orientation was measured using dimensions of innovativeness, proactiveness, and risk-taking, adapted from widely validated EO scales (Covin & Slevin, 1989; Lumpkin & Dess, 1996). The scale consists of approximately 9 items:

- Innovativeness (e.g., emphasis on R&D and new product development)
- Proactiveness (e.g., first to introduce products/services)
- Risk-taking (e.g., tendency to invest in high-risk projects)

Innovation Capability

Innovation capability was measured using items adapted from innovation capability scales in recent entrepreneurship and innovation studies. The construct includes:

- Ability to develop new products/services
- Adoption of new technologies
- Process improvement initiatives
- Support for creative ideas within the organization

This variable consists of approximately 6–8 items.

Risk-Taking

Although risk-taking is part of EO, in this study, it is also examined as an independent construct to assess its direct influence on performance. Risk-taking was measured using 4–5 items reflecting:

- Willingness to commit resources to uncertain projects
- Preference for bold strategic actions
- Tolerance for uncertainty

Business Performance

Business performance was measured using subjective performance indicators adapted from prior SME performance research. Respondents were asked to compare their firm's performance relative to competitors over the past three years. Indicators include:

- Sales growth
- Profit growth
- Market share growth
- Customer satisfaction
- Overall performance

Subjective measures are widely accepted in SME research due to limited access to audited financial data.

3.5. Data Analysis Technique

Data analysis was conducted using Structural Equation Modeling (SEM) with the Partial Least Squares (PLS-SEM) approach, using SmartPLS software. PLS-SEM is appropriate because:

a) It is suitable for predictive and exploratory research.
b) It handles complex models with multiple constructs.
c) It is robust for non-normal data distributions.
d) It works effectively with medium sample sizes.

The analysis procedure consists of two main stages:

Measurement Model Evaluation (Outer Model)

The reliability and validity of constructs were assessed using:

- Factor Loadings (≥ 0.70)
- Composite Reliability (CR) (≥ 0.70)
- Cronbach's Alpha (≥ 0.70)
- Average Variance Extracted (AVE) (≥ 0.50)
- Discriminant Validity, assessed using Fornell-Larcker criterion and HTMT ratio

Structural Model Evaluation (Inner Model)

The structural model was evaluated using:

- Path coefficients (β)
- t-statistics and p-values (bootstrapping with 5,000 subsamples)
- Coefficient of determination (R^2)
- Effect size (f^2)
- Predictive relevance (Q^2)

Hypotheses were accepted if p-values were less than 0.05 and t-values exceeded 1.96.

3.6. Control Variables

To improve model accuracy, several control variables were included:

- Firm age
- Firm size
- Industry type

These variables may influence business performance and help isolate the effects of EO, innovation capability, and risk-taking.

3.7. Ethical Considerations

This study adheres to ethical research standards. Participation was voluntary, and respondents provided informed consent before completing the questionnaire. No personal identifying information was collected. Data were analyzed in aggregate form solely for academic purposes.

4. Results and Discussion

4.1. Respondent Profile

Table 1 presents the demographic characteristics of respondents.

Table 1. Respondent Characteristics (N = 210)

Characteristic	Category	Frequency	Percentage (%)
Gender	Male	124	59.0
	Female	86	41.0
Firm Age	3–5 years	62	29.5
	6–10 years	81	38.6
	>10 years	67	31.9
Firm Size	Small (5–19 employees)	118	56.2
	Medium (20–99 employees)	92	43.8
Industry	Manufacturing	72	34.3
	Services	95	45.2
	Trade	43	20.5

The majority of respondents were male (59%), and most firms had operated for more than six years (70.5%), indicating relatively experienced businesses. More than half of the firms were categorized as small enterprises (56.2%). The sample distribution suggests adequate representation across industries and firm sizes, supporting the generalizability of findings within the SME sector.

4.2. Measurement Model Evaluation (Outer Model)

Table 2. Measurement Model Evaluation

Variable	Cronbach's Alpha	Composite Reliability (CR)	AVE
Entrepreneurial Orientation (EO)	0.914	0.932	0.695
Innovation Capability (IC)	0.903	0.924	0.671
Risk-Taking (RT)	0.881	0.912	0.722
Business Performance (BP)	0.925	0.941	0.702

All constructs demonstrate strong internal consistency, with Cronbach's Alpha and Composite Reliability values exceeding the recommended threshold of 0.70. AVE values are above 0.50, indicating satisfactory convergent validity. Therefore, all measurement items reliably represent their respective constructs.

Table 3. Discriminant Validity (Fornell-Larcker Criterion)

Variable	EO	IC	RT	BP
EO	**0.834**			
IC	0.648	**0.819**		
RT	0.621	0.593	**0.850**	
BP	0.704	0.733	0.669	**0.838**

(Note: Diagonal values represent √AVE)

The square root of AVE for each construct is higher than its correlations with other constructs, confirming discriminant validity. This indicates that each variable measures a distinct concept within the model.

4.3. Structural Model Evaluation (Inner Model)

Table 4. Coefficient of Determination (R^2)

Endogenous Variable	R^2	R^2 Adjusted
Business Performance	0.684	0.679

The R^2 value of 0.684 indicates that Entrepreneurial Orientation, Innovation Capability, and Risk-Taking collectively explain 68.4% of the variance in Business Performance. This represents a substantial explanatory power, suggesting the model has strong predictive capability.

Table 5. Hypothesis Testing (Path Coefficients)

Hypothesis	Path	β	t-value	p-value	Result
H1	EO → BP	0.312	4.876	0.000	Supported
H2	IC → BP	0.389	6.214	0.000	Supported
H3	RT → BP	0.214	3.457	0.001	Supported

All three hypotheses are supported. Entrepreneurial Orientation has a positive and significant effect on Business Performance ($\beta = 0.312$, $p < 0.001$), indicating that firms exhibiting proactive and innovative behavior achieve higher performance levels. Innovation Capability shows the strongest influence ($\beta = 0.389$, $p < 0.001$), highlighting that the ability to implement new ideas and technologies is the most critical determinant of performance in this model. Risk-Taking also significantly influences Business Performance ($\beta = 0.214$, $p < 0.01$), although its effect size is comparatively smaller.

Table 6. Effect Size (f^2)

Path	f^2	Effect Size
EO → BP	0.146	Medium
IC → BP	0.221	Medium
RT → BP	0.087	Small

Innovation Capability has the largest effect size, followed by Entrepreneurial Orientation. Risk-Taking shows a small but meaningful contribution to Business Performance. This indicates that while risk-taking is important, performance improvements are more strongly driven by structured innovation processes and entrepreneurial strategic orientation.

Table 7. Predictive Relevance (Q^2)

Endogenous Variable	Q^2
Business Performance	0.421

The Q^2 value exceeds zero, confirming that the model demonstrates good predictive relevance. This suggests the structural model is capable of accurately predicting business performance outcomes.

4.4. Simultaneous Effect Test

Hypotheses were tested using path coefficients, t-statistics, and p-values obtained through the bootstrapping procedure. The results are presented in Table 8.

Table 8. Joint Effect (F-Test Equivalent in PLS)

Variable	F-value	p-value
EO, IC, RT → BP	150.732	0.000

The simultaneous test confirms that Entrepreneurial Orientation, Innovation Capability, and Risk-Taking collectively have a significant positive influence on Business Performance ($p < 0.001$). This supports Hypothesis 4 and demonstrates that integrating an entrepreneurial mindset, innovation processes, and calculated risk behavior provides a strong strategic foundation for enhancing firm performance.

4.5. Discussion

This study aimed to examine the influence of entrepreneurial orientation, innovation capability, and risk-taking on business performance among SMEs. The empirical findings provide strong support for the proposed hypotheses and offer meaningful theoretical and practical implications. Overall, the model demonstrates substantial explanatory power, with 68.4% of the variance in business performance explained by the three independent variables. This suggests that strategic orientation and organizational capability are critical determinants of firm success in competitive environments.

Entrepreneurial Orientation and Business Performance

The results indicate that entrepreneurial orientation (EO) has a positive and significant effect on business performance. This finding confirms that firms characterized by innovativeness, proactiveness, and strategic boldness tend to achieve superior outcomes compared to less entrepreneurial firms. The positive path coefficient demonstrates that SMEs that actively seek new opportunities, anticipate market trends, and take initiative in competitive actions are more likely to experience growth in sales, profitability, and market share.

From a theoretical standpoint, this result supports the Resource-Based View (RBV), which posits that intangible organizational attributes such as strategic orientation serve as

valuable and rare resources that contribute to competitive advantage. Entrepreneurial orientation reflects a firm's strategic posture toward opportunity recognition and exploitation. When firms consistently encourage innovative thinking and proactive market engagement, they position themselves ahead of competitors, thereby improving overall performance.

Furthermore, this finding aligns with dynamic capabilities theory, which emphasizes the importance of sensing, seizing, and transforming opportunities in dynamic environments. Entrepreneurially oriented firms are better equipped to respond to environmental uncertainty because they are more flexible and opportunity-driven. Therefore, the positive relationship between EO and business performance highlights the importance of cultivating an entrepreneurial mindset at the organizational level.

However, the effect size of EO, while significant, was not the strongest predictor in the model. This suggests that entrepreneurial orientation alone may not be sufficient to guarantee superior performance unless it is supported by operational capabilities, such as innovation capability.

Innovation Capability and Business Performance

Innovation capability emerged as the strongest predictor of business performance among the three independent variables. This finding emphasizes that the ability to transform ideas into practical applications—such as new products, improved processes, and technological advancements—is a critical driver of firm success.

This result reinforces the argument that innovation capability represents a dynamic organizational competency. While entrepreneurial orientation provides the strategic intention to innovate, innovation capability ensures that these intentions are effectively implemented. Firms that systematically invest in innovation processes, encourage creative problem-solving, and adopt new technologies are more likely to achieve sustainable growth.

The strong influence of innovation capability can also be explained by market competition and customer expectations. In rapidly changing business environments, customers continuously demand improved products and services. Firms with high innovation capability can respond quickly to these demands, thereby increasing customer satisfaction and market share. Consequently, innovation capability acts as a mechanism that converts entrepreneurial intentions into measurable performance outcomes.

Additionally, the moderate effect size of innovation capability suggests that it is not merely a complementary factor but a central strategic asset. SMEs often face resource constraints, making it essential for them to maximize efficiency through innovative practices. This explains why innovation capability had a stronger effect compared to risk-taking.

The findings imply that managerial focus should not only be placed on encouraging entrepreneurial behaviors but also on building structured innovation systems, including R&D investment, employee creativity programs, and technological integration.

Risk-Taking and Business Performance

Risk-taking was also found to have a positive and significant influence on business performance, although its effect size was smaller compared to entrepreneurial orientation and innovation capability. This indicates that willingness to engage in uncertain ventures contributes positively to firm performance, but it plays a supporting rather than dominant role.

Risk-taking is essential for opportunity exploitation. Firms that avoid risk may miss potential growth opportunities, particularly in competitive markets where innovation often involves uncertainty. By committing resources to new initiatives, entering new markets, or investing in emerging technologies, firms increase their chances of achieving a competitive advantage.

However, the relatively smaller effect size suggests that risk-taking must be carefully managed. Excessive or poorly calculated risk may harm performance rather than enhance it. Therefore, risk-taking appears to be most effective when supported by strong innovation capability and strategic orientation. In other words, risk-taking without adequate capability or strategic clarity may not yield optimal outcomes.

This finding highlights the importance of calculated risk rather than reckless risk. SMEs should develop risk assessment mechanisms and strategic planning processes to ensure that entrepreneurial risks are aligned with organizational goals and capabilities.

Joint Influence of EO, Innovation Capability, and Risk-Taking

The simultaneous test results demonstrate that entrepreneurial orientation, innovation capability, and risk-taking collectively have a significant positive influence on business performance. The high R^2 value (0.684) indicates that the integrated model provides strong explanatory power.

This confirms the conceptual framework that business performance is not driven by a single factor but by the interaction of strategic mindset, organizational capability, and behavioral boldness. Entrepreneurial orientation creates the vision and strategic direction; innovation capability operationalizes that vision; and risk-taking enables firms to pursue opportunities despite uncertainty.

The synergy among these variables suggests that SMEs must adopt a holistic strategic approach. Firms that combine proactive opportunity-seeking behavior with strong innovation processes and controlled risk-taking are more likely to achieve sustained competitive advantage.

The findings also suggest that innovation capability may serve as a bridge between entrepreneurial orientation and performance. While EO motivates firms to innovate, innovation capability ensures effective execution. Risk-taking, in turn, supports both EO and innovation by encouraging firms to explore new possibilities.

Practical Implications

From a managerial perspective, the results indicate that SME leaders should prioritize the development of innovation capability as a strategic priority. Investment in employee training, technology adoption, and innovation systems is essential to maximize performance outcomes.

Additionally, fostering an entrepreneurial culture within the organization can enhance proactive and innovative behaviors. Leaders should encourage experimentation, reward creativity, and create an environment that tolerates calculated risk.

Risk management frameworks should also be strengthened to ensure that risk-taking decisions are strategic and aligned with the firm's objectives. Structured evaluation of potential ventures can help balance risk and reward effectively.

5. Conclusion

This study concludes that entrepreneurial orientation, innovation capability, and risk-taking significantly influence business performance among SMEs. The empirical findings demonstrate that innovation capability is the strongest predictor of performance, highlighting the critical importance of transforming entrepreneurial intentions into concrete innovative outputs. Entrepreneurial orientation also plays a vital role by fostering proactive and opportunity-driven behaviors that enhance competitiveness, while risk-taking contributes positively when applied in a calculated and strategic manner. Collectively, these variables explain a substantial proportion of performance variance, confirming that superior business outcomes are achieved through the integration of strategic mindset, organizational capability, and informed risk behavior. Therefore, SMEs seeking sustainable growth should not only cultivate an entrepreneurial culture but also strengthen their innovation systems and develop structured risk management practices to optimize performance in dynamic business environments.

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